8. (Amended) The method according to any one of claims 1 to 7, wherein said one or more antisense oligomers is provided to a subject in an amount sufficient to result in a peak blood concentration of at least 200-400 nM.

9. (Amended) The method according to claim 8, wherein said providing is carried out at a concentration of said one or more antisense oligomers, and for a period of time sufficient to increase the number of lineage committed progenitor cells and their progeny in the peripheral circulation of the subject at least four-fold relative to the number of lineage committed progenitor cells and their progeny present in the peripheral blood of the subject prior to administration of said one or more antisense oligomers.

10. (Amended) A method of modulating hematopoietic stem cell differentiation, comprising:

(a) obtaining a stem cell-containing cell population from a subject;

(b) treating the cell population in manner effective to enrich the cell population for stem cells; and

(c) exposing the enriched stem cell population, *ex vivo* to one or more antisense oligomers directed to an mRNA preferentially expressed in stem cells, under conditions effective to (i) to increase the population of lineage committed progenitor cells and their progeny in the peripheral circulation of the subject, and/or (ii) effect a slowing or diminution of the growth of cells exhibiting a loss of growth control, or a reduction in the total number of such cells; and

(d) infusing the antisense oligomer-treated cell population into said subject.

17. (Amended) A composition comprising an antisense oligomer characterized by a backbone which is substantially uncharged, where said oligomer is directed to a sequence spanning the mRNA translational start codon of a gene preferentially expressed in stem cells.

18. (Amended) The composition according to claim 17, wherein said antisense oligomer is characterized by,

(a) the ability to hybridize with the complementary sequence of a target RNA with high affinity at a Tm greater than 50°C;

(b) nuclease resistance; and

(c) the capability for active or facilitated transport into cells.